INDEX TO VOLUME XXII

SUBJECTS.

PAGE

ABSORPTION Bands, Remarks on Dr. O. C. Lester's Contribution on Oxygen. *George Higgs* - - - - - - - - - - - 346
ACTION of Prism on White Light, Elementary Discussion of. *J. S. Ames* 76
Algol Variables, Density of. *J. H. Jeans* - - - - - - - 93
ALLOYS, Spectra of. *P. G. Nutting* - - - - - - - - 131
ANOMALOUS Tails of Comets. *E. E. Barnard* - - - - - - 249
APOLOGY and an Explanation. *F. R. Moulton* - - - - - - 355
Aquilae of 1905, *Nova*. *J. A. Parkhurst* - - - - - - - 266
Nova No. 2. 185604, H 1175. *Edward C. Pickering* - - - 271
Nova of 1905. *E. E. Barnard* - - - - - - - - - - 358
ARC Spectra, Variation of, with Phase of Current Producing Them. *H. Crew* and *B. J. Spence* - - - - - - - - - - - 199
Spectrum of Iron, Effect of Pressure of 37 Atmospheres on Certain Lines of. *W. J. Humphreys* - - - - - - - - - 217
In High Vacua. *R. E. Loving* - - - - - - - - - 285
ATMOSPHERES, Effect of Pressure of 37, on Certain Lines of Arc Spectrum of Iron. *W. J. Humphreys* - - - - - - - - - 217
BANDS, Reversal of. *W. J. Humphreys* - - - - - - - - 220
BINARY, ζ *Tauri*, Orbit of Spectroscopic. *Walter S. Adams* - - - 115
BRACE, DeWitt Bristol. *W. F. Magie* - - - - - - - - 343
CALIBRATION of Wedge Photometer. *James D. Maddrill* - - - 138
COMETS, On the Anomalous Tails of. *E. E. Barnard* - - - - 249
CO-OPERATION in Solar Research: Meeting at Oxford, September 27–29, 1905, International Union for - - - - - - - - - 276
DIFFRACTION Grating Replicas. *Robert James Wallace* - - - - 123
ENHANCED Series of Titanium, Iron, and Nickel. *H. M. Reese* - - 222
EVOLUTION of the Solar System. *F. R. Moulton* - - - - - - 165
Of The Solar System, Note on. *W. H. Pickering* - - - 354
EXPLANATION, An Apology and an. *F. R. Moulton* - - - 355
FLUORINE, Note on Spectrum of. *Joseph Lunt* - - - - - - 256
FLUOR-SPARS Containing Yttrium and Ytterbium, A Few Additional. *W. J. Humphreys* - - - - - - - - - - - 157
γ *Geminorum*, Variable Radial Velocity of. *V. M. Slipher* - - - 84
GRATING Replicas, Diffraction. *Robert James Wallace* - - - - 123
INFRA-RED Spectrum, Selective Reflection in. *James T. Porter* - - 229

PAGE

IRON, Effect of Pressure of 37 Atmospheres on Certain Lines of Arc Spectrum of. *W. J. Humphreys* - - - - - - - - - 217
And Nickel, On Enhanced Series of Titanium. *H. M. Reese* - - 222
LIGHT, Elementary Discussion of Action of a Prism on White. *J. S. Ames* - - - - - - - - - - - - - - - 76
LIGHT- and Velocity-Curves of *W Sagittarii*. *R. H. Curtiss* - - 274
LOWELL Spectrograph, Observations of Standard Velocity Stars with the. *V. M. Slipher* - - - - - - - - - - - - 318
MAGNESIUM Spark. *W. W. Strong* - - - - - - - - - 119
NICKEL, On Enhanced Series of Titanium, Iron and. *H. M. Reese* - 222
Nova Aquilae of 1905. *J. A. Parkhurst* - - - - - - - 266
No. 2. 185604. *Edward C. Pickering* - - - - - - - 271
Of 1905. *E. E. Barnard* - - - - - - - - - 358
RS Ophiuchi, A Probable New Star. *Edward C. Pickering* - - - 90
ORBIT of Spectroscopic Binary ζ *Tauri*. *Walter S. Adams* - - - 115
"ORTHOCHROMATIC" Plates, Preliminary Note on. *Robert James Wallace* 153
Second Note on. *Robert James Wallace* - - - - - - 350
OXFORD, September 27–29, 1905, International Union for Co-operation in Solar Research: Meeting at - - - - - - - - - - 276
"OXYGEN Absorption Bands of Solar Spectrum," Remarks on Dr. O. C. Lester's Contribution on. *George Higgs* - - - - - - 346
PHOTOMETER, Calibration of Wedge. *James D. Maddrill* - - - 138
PLATES, Preliminary Note on "Orthochromatic." *Robert James Wallace* 153
Second Note on "Orthochromatic." *Robert James Wallace* - - 350
PRESSURE of 37 Atmospheres on Certain Lines of Arc Spectrum of Iron, Effect of. *W. J. Humphreys* - - - - - - - - - 217
PRISM on White Light, Elementary Discussion of Action of. *J. S. Ames* 76
RADIAL Velocity of γ *Geminorum*, Variable. *V. M. Slipher* - - - 84
RADIUM, Spectrum of Spontaneous Luminous Radiation of. III. *Sir William Huggins* and *Lady Huggins* - - - - - - - 204
REFLECTION in Infra-red Spectrum, Selective. *James T. Porter* - - 229
REPLICAS, Diffraction Grating. *Robert James Wallace* - - - - 123
REPLY to Professor F. R. Moulton. *W. H. Pickering* - - - - 357
REVERSAL of Bands. *W. J. Humphreys* - - - - - - - 220
REVIEWS, See Table of Contents.
W Sagittarii, On Light- and Velocity-Curves of. *R. H. Curtiss* - - 274
SELECTIVE Reflection in Infra-red Spectrum. *James T. Porter* - - 229
SERIES of Titanium, Iron, and Nickel, On Enhanced. *H. M. Reese* - 222
SILICON Lines, Wave-lengths of Certain. *Edwin B. Frost* and *Julius A. Brown* - - - - - - - - - - - - - - 157
On Spectrum of; With Note on Spectrum of Fluorine. *Joseph Lunt* 256
SOLAR and Terrestrial Phenomena, Synchronous Variations in. *H. W. Clough* - - - - - - - - - - - - - - 42

PAGE

System, On Evolution of. *F. R. Moulton* - - - - - - 165
System, Note on Evolution of. *W. H. Pickering* - - - - 354
Research: Meeting at Oxford, September 27–29, 1905, International Union for Co-operation in. - - - - - - - - - 276
Spectrum, Remarks on Dr. O. C. Lester's Contribution on Oxygen Absorption Bands of. *George Higgs* - - - - - - - 346
SPARK, Magnesium. *W. W. Strong* - - - - - - - - - 119
Spectra, Variability of Wave-length in Lines of. *Norton A. Kent* - 182
SPECTRA, Stars Having Peculiar; Spectra of Known Variables. *Edward C. Pickering* - - - - - - - - - - - - - 87
Of Alloys. *P. G. Nutting* - - - - - - - - - - 131
Variability of Wave-length in Lines of Spark. *Norton A. Kent* - 182
Variation of Arc, with Phase of Current Producing Them. *H. Crew* and *B. J. Spence* - - - - - - - - - - - 199
SPECTROGRAPH, Observations of Standard Velocity Stars with the Lowell, (1905). *V. M. Slipher* - - - - - - - - - - 318
SPECTROGRAPHIC Observations of Certain Variable Stars. *Edwin B. Frost* 213
SPECTROSCOPIC Binary ζ *Tauri*, Orbit of. *Walter S. Adams* - - - 115
Observations of Rotation of Sun. *J. Halm* - - - - - - 150
SPECTRUM, Region F to a, Researches in Sun-spot. *Walter M. Mitchell*, 4
Of Spontaneous Luminous Radiation of Radium. III. *Sir William Huggins* and *Lady Huggins* - - - - - - - - - 204
Of Iron, Effect of Pressure of 37 Atmospheres on Certain Lines of Arc. *W. J. Humphreys* - - - - - - - - - - 217
Selective Reflection in Infra-red. *James T. Porter* - - - - - 229
Of Fluorine, Note on. *Joseph Lunt* - - - - - - - 256
Of Silicon; With Note on Spectrum of Fluorine. *Joseph Lunt* - - 256
Remarks on Dr. O. C. Lester's Contribution on Oxygen Absorption Bands of Solar. *George Higgs* - - - - - - - - 346
STAR, A Probable New, *RS Ophiuchi*. *Edward C. Pickering* - - 90
STARS Having Peculiar Spectra; Spectra of Known Variables. *Edward C. Pickering* - - - - - - - - - - - - - 87
Spectrographic Observations of Certain Variable. *Edwin B. Frost* 213
Observations of Standard Velocity, with the Lowell Spectrograph (1905). *V. M. Slipher* - - - - - - - - - - 318
SUN, Figure of the. *Charles Lane Poor* - - - - - - - 103
Figure of the. II. *Charles Lane Poor* - - - - - - - 305
Spectroscopic Observations of Rotation of. *J. Halm* - - - - 150
SUN-SPOT Spectrum, Region F to a, Researches in. *Walter M. Mitchell* 4
SYNCHRONOUS Variations in Solar and Terrestrial Phenomena. *H. W. Clough* - - - - - - - - - - - - - - 42
SYSTEM, On Evolution of Solar. *F. R. Moulton* - - - - - - 165
Note on Evolution of Solar. *W. H. Pickering* - - - - - 354

PAGE

TACCHINI, Pietro. *A. Riccò* - - - - - - - - - - - - 1

ξ Tauri, Orbit of Spectroscopic Binary. *Walter S. Adams* - - - 115

TERRESTRIAL Phenomena, Synchronous Variations in Solar and. *H. W. Clough* - - - - - - - - - - - - - - 42

THALÉN, Tobias Robert. *N. C. Dunér* - - - - - - - - 341

TITANIUM, Iron, and Nickel, On Enhanced Series of. *H. M. Reese* - 222

UNION, International, for Co-operation in Solar Research: Meeting at Oxford, September 27–29, 1905 - - - - - - - - 276

VACUA, Arc in High. *R. E. Loving* - - - - - - - - - 285

VARIABILITY of Wave-length in Lines of Spark Spectra. *Norton A. Kent*, 182

VARIABLE Stars, Spectrographic Observations of Certain. *Edwin B. Frost* - - - - - - - - - - - - - - - 213

VARIABLES, Spectra of Known; Stars Having Peculiar Spectra. *Edward C. Pickering* - - - - - - - - - - - - - 87

Density of *Algol*. *J. H. Jeans* - - - - - - - - - 93

VARIATION of Arc Spectra with Phase of Current Producing Them. *H. Crew* and *B. J. Spence* - - - - - - - - - - 199

In Solar and Terrestrial Phenomena, Synchronous. *H. W. Clough*, 42

VELOCITY of *γ Geminorum*, Variable Radial. *V. M. Slipher* - - - 84

VELOCITY-CURVES of *W Sagittarii*, On Light- and. *R. H. Curtiss* - - 274

VELOCITY Stars, Observations of Standard, with Lowell Spectrograph (1905). *V. M. Slipher* - - - - - - - - - - 318

WAVE-LENGTH in the Lines of Spark Spectra, Variability of. *Norton A. Kent* - - - - - - - - - - - - - - - 182

Of Certain Silicon Lines. *Edwin B. Frost* and *Julius A. Brown* - 157

WEDGE Photometer, Calibration of. *James D. Maddrill* - - - - 138

WISLICENUS, Walter F. *Edwin B. Frost* - - - - - - - - 345

YTTERBIUM, A Few Additional Fluor-spars Containing Yttrium and. *W. J. Humphreys* - - - - - - - - - - - - 157

YTTRIUM and Ytterbium, A Few Additional Fluor-spars Containing. *W. J. Humphreys* - - - - - - - - - - - - 157

ZODIACAL Light to North of the Sun, Observation of. *Simon Newcomb* 209

INDEX TO VOLUME XXII

AUTHORS

PAGE

ADAMS, WALTER S. The Orbit of the Spectroscopic Binary ζ *Tauri* - 115
AMES, J. S. An Elementary Discussion of the Action of a Prism on White Light - - - - - - - - - - - - - - - 76
BARNARD, E. E. On the Anomalous Tails of Comets - - - - - 249
Nova Aquilae of 1905 - - - - - - - - - - - 358
W. P. BOYNTON. Review of: *The Dynamical Theory of Gases*, J. H. Jeans - - - - - - - - - - - - - - - 224
BROWN, JULIUS A., and EDWIN B. FROST. Wave-lengths of Certain Silicon Lines - - - - - - - - - - - - 157
CLOUGH, H. W. Synchronous Variations in Solar and Terrestrial Phenomena - - - - - - - - - - - - - - - 42
COBLENTZ, WILLIAM W. Review of: *Handbuch der Spectroscopie*, H. Kayser - - - - - - - - - - - - - - - 281
CREW, HENRY, and B. J. SPENCE. Variation of Arc Spectra With Phase of the Current Producing Them - - - - - - - - - 199
CREW HENRY. Review of: *Atlas of Emission Spectra of Most of the Elements*, A. Hagenbach and H. Konen - - - - - - 226
CURTISS, R. H. On the Light- and Velocity-Curves of *W Sagittarii* - - 274
DUNÉR, N. C. Tobias Robert Thalén - - - - - - - - - 341
FROST, EDWIN B. Review of: *Index to the Literature of the Spectroscope* (1887–1900), Alfred Tuckerman - - - - - - - - - 162
Spectrographic Observations of Certain Variable Stars - - - 213
Review of: *Lehrbuch der Physik*, O. D. Chwolson - - - - 227
Note - - - - - - - - - - - - - - - - 270
Walter F. Wislicenus - - - - - - - - - - - 345
FROST, EDWIN B. and JULIUS A. BROWN. Wave-lengths of Certain Silicon Lines - - - - - - - - - - - - - 157
HIGGS, GEORGE. Some Remarks on Dr. O. C. Lester's Contribution "On the Oxygen Absorption Bands of the Solar Spectrum" - - 346
HALM, J. On Spectroscopic Observations of the Rotation of the Sun - 150
HUGGINS, SIR WILLIAM, and LADY HUGGINS. On the Spectrum of the Spontaneous Luminous Radiation of Radium. III. - - - 204
HUMPHREYS, W. J. A Few Additional Fluor-Spars Containing Yttrium and Ytterbium - - - - - - - - - - - - 157
The Effect of a Pressure of 37 Atmospheres on Certain Lines of the Arc Spectrum of Iron - - - - - - - - - - - 217
Reversal of Bands - - - - - - - - - - - - 220

PAGE

JEANS, J. H. On the Density of *Algol* Variables - - - - - - 93
KENT, NORTON A. Variability of Wave-Length in the Lines of Spark Spectra - - - - - - - - - - - - - - - - 182
LAVES, KURT. Review of: *Astrometrie: oder, Die Lehre von der Ortsbestimmung im Himmelsraume*, Wilhelm Foerster - - - - - 283
LOVING, R. E. The Arc in High Vacua - - - - - - - - 285
LUNT, JOSEPH. On the Spectrum of Silicon; with a note on the Spectrum of Fluorine - - - - - - - - - - - - - - 256
MADDRILL, JAMES D. Calibration of a Wedge Photometer - - - 138
MAGIE, W. F. DeWitt Bristol Brace - - - - - - - - - 343
MITCHELL, WALTER M. Researches in the Sun-spot Spectrum, Region F to a - - - - - - - - - - - - - - - - 4
MOULTON, F. R. On the Evolution of the Solar System - - - 165
An Apology and an Explanation - - - - - - - - - 355
NEWCOMB, SIMON. An Observation of the Zodiacal Light to the North of the Sun - - - - - - - - - - - - - - - 209
NUTTING, P. G. The Spectra of Alloys - - - - - - - - 131
PARKHURST, J. A. Review of: *Popular Star Maps: A Rapid and Easy Method of Finding the Principal Stars*, Comte de Miremont - - 163
Nova Aquilae of 1905 - - - - - - - - - - - - 266
PICKERING, EDWARD C. Stars Having Peculiar Spectra; Spectra of Known Variables - - - - - - - - - - - - 87
A Probable New Star *RS Ophiuchi* - - - - - - - - 90
H 1175. *Nova Aquilae*, No. 2. 185604 - - - - - - - 271
PICKERING, WILLIAM H. Note on the Evolution of the Solar System - 354
Reply to Professor F. R. Moulton - - - - - - - - 357
POOR, CHARLES LANE. The Figure of the Sun - - - - - - 103
The Figure of the Sun. II - - - - - - - - - 305
PORTER, JAMES T. Selective Reflection in the Infra-Red Spectrum - - 229
REESE, H. M. On the Enhanced Series of Titanium, Iron, and Nickel - 222
RICCÒ, A. Pietro Tacchini - - - - - - - - - - - - 1
SCHLESINGER, FRANK. Review of: *Guide du Calculateur*, J. Boccardi - 161
SLIPHER, V. M. The Variable Radial Velocity of γ *Geminorum* - - 84
Observations of Standard Velocity Stars with the Lowell Spectrograph (1905) - - - - - - - - - - - - - - 318
SPENCE, B. J., and HENRY CREW. Variation of Arc Spectra with Phase of the Current Producing them - - - - - - - - - 199
STRONG, W. W. On the Magnesium Spark - - - - - - - 119
WALLACE, ROBERT JAMES. Diffraction Grating Replicas - - - 123
Preliminary Note on "Orthochromatic" Plates - - - - - 153
Second Note on "Orthochromatic" Plates - - - - - - 350